



MAUL FOSTER ALONGI

3121 SW Moody Avenue, Suite 200 | Portland, OR 97239 | www.maulfooster.com

March 6, 2009

Project No. 8128.01.20

Mr. Dana Bayuk

Oregon Department of Environmental Quality

2020 SW 4th Avenue

Portland, Oregon

Re: Western Supplemental EIB Injection Grid – Siltronic Corporation

Dear Mr. Bayuk:

The following letter presents an evaluation of monitoring well and reconnaissance groundwater sampling data to support modification of a portion of the Revised Enhanced In-Situ Bioremediation Source Control Workplan (the Workplan).

During the January 20, 2009 meeting with Oregon Department of Environmental Quality (DEQ), DEQ recommended additional delineation of the extent of trichloroethene (TCE) above the injection threshold (11,000 ug/L) in a proposed supplemental injection area near monitoring well WS-15-85. In response to that recommendation, two additional reconnaissance groundwater sample borings (GP-136 and GP-137) were completed on January 27 and February 13, 2009. During air knifing to locate those borings, significant buried utilities were found, which preclude or complicate extending the injection grid west to WS-15-85.

Samples in GP-136 were collected at intervals corresponding to those in GP-121 (completed on July 2, 2008). Samples in GP-137 were collected only at 55 and 74 feet below ground surface (bgs) based on the GP-136 data. The most recent quarterly monitoring sample from WS-15-85 was also incorporated into the data evaluation.

The boring locations and results are shown on Figure 1. MFA has developed the following conclusions based on the results:

1. TCE is present above the injection threshold in samples collected from 74 ft bgs from borings GP-121 and GP-137, but is well below the injection threshold in GP-136.
2. The linear regression shown on the inset to Figure 1 suggests that the extent of the injection threshold is approximately 25 ft plant east from WS-15-85.
3. The western supplemental injection grid should be revised as shown on Figure 1. The vertical extent of injections will be 40 – 102 feet bgs, with offsets consistent with the current approach.

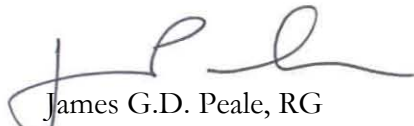
Mr. Dana Bayuk
March 6, 2009
Page 2

Project No. 8128.01.20

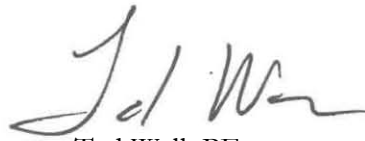
The data are summarized on Table 1. MFA will continue injections in the Western Supplemental Grid, moving plant east to west. We will contact you shortly to discuss this modification.

Sincerely,

Maul Foster & Alongi, Inc.



James G.D. Peale, RG
Senior Hydrogeologist



Ted Wall, PE
Principal Engineer

Attachments: Figure
Table

cc: Tom McCue, Siltronic Corporation (electronic and hard copy)
Alan Gladstone, Davis Rothwell Earle and Xochihua (electronic and hard copy)
Chris Reive, Jordan Schrader Ramis (electronic and hard copy)
Jim Anderson, DEQ (electronic)
Kristine Koch, EPA (electronic)
Sean Sheldrake, EPA Seattle (electronic)
Rene Fuentes, EPA Seattle (electronic)
Eric Blischke, EPA Portland (electronic)
Chip Humphrey, EPA Portland (electronic)

FIGURE



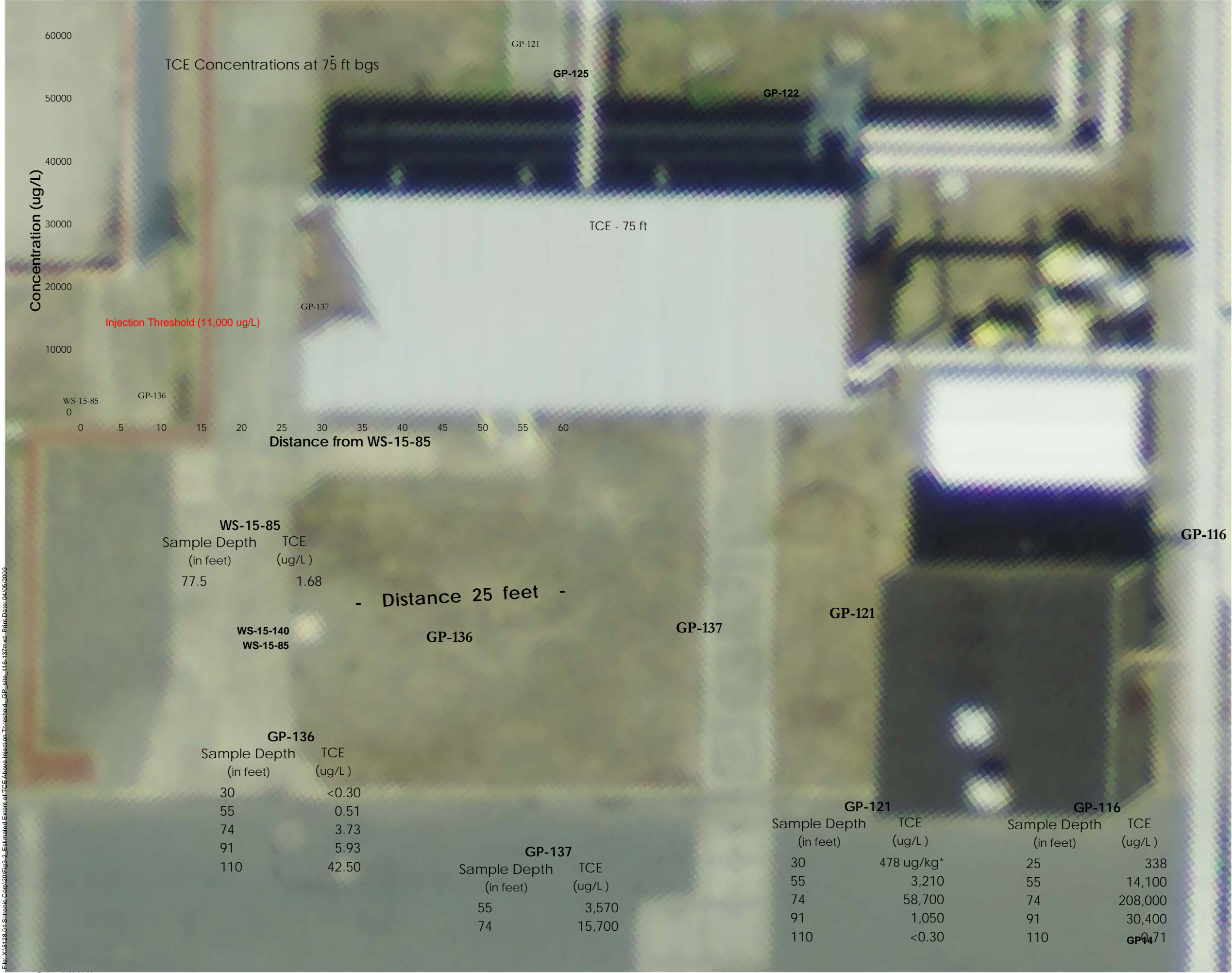


Figure 1
Revised
Western Supplemental
Injection Area

Siltronic Corporation
Portland, Oregon

Legend

Reconnaissance Groundwater
Borings

Monitoring Well

Supplemental Upgradient
Injection

EIB injection point locations are
subject to field adjustment based
upon the presence of subsurface
utilities.

* Represents TCE in MGP DNAPL
sample. No groundwater collected
at this depth/location.

Source: Aerial Photograph (2007) obtained
from Metro Data Resource Center

TABLE



Table 1
Reconnaissance Groundwater and Recent Quarterly Monitoring Data
Western Supplemental Grid Modification
Siltronic Corporation
Portland, Oregon

Site ID	Date	Depth (ft- bgs)	TCE	cis-1,2- DCE	trans-1,2- DCE	1,1-DCE	Vinyl chloride
GP116	6/3/2008	25	338	<15	<25	<25	<15
GP116	6/3/2008	55	14,100	43,700	492	179	17.70
GP116	6/3/2008	74	208,000	10,400	52.30	58	10.90
GP116	6/3/2008	91	30,400	46,800	522	72.60	32.70
GP116	6/4/2008	110	0.71	<0.3	<0.5	<0.5	<0.3
GP121 ¹	7/2/2008	30	478	<20000	<20000	<20000	<20000
GP121	7/2/2008	55	3,210	78,600	497	166	<30
GP121	7/2/2008	74	58,700	44,600	325	148	12.90
GP121	7/2/2008	91	1,050	13,100	32.20	36.80	2.39
GP121	7/3/2008	110	<0.3	0.40	<0.5	<0.5	<0.3
GP136	1/27/2009	30	<0.3	2.00	<0.5	<0.5	<0.3
GP136	1/27/2009	55	0.51	2,040	22.20	2.00	1.92
GP136	1/27/2009	75	3.73	4,910	41.40	7.85	2.10
GP136	1/27/2009	90	5.93	65.90	<0.5	<0.5	<0.3
GP136	1/27/2009	110	42.50	48.70	<0.5	<0.5	<0.3
GP137	2/13/2009	55	3,570	17,200	595	27	11.90
GP137	2/13/2009	75	15,700	36,900	1,030	84.60	8.63
WS-15-85	11/11/2008	80	1.68	244	0.97	<0.5	5.86

Notes

Results in ug/L unless otherwise noted.

1 - MGP DNAPL sample, with results in ug/kg; no groundwater collected at this interval.